

Title (en)

PROCESS FOR OBTAINING THICK ORDERED FILMS WITH INCREASED PERIODS COMPRISING A BLOCK COPOLYMER

Title (de)

VERFAHREN ZUR HERSTELLUNG VON DICKEN GEORDNETEN FOLIEN MIT ERHÖHTEN PERIODEN, DIE EIN BLOCKCOPOLYMER UMFASSEN

Title (fr)

PROCÉDÉ D'OBTENTION DE FILMS ORDONNÉS ÉPAIS AYANT DES PÉRIODES ACCRUES COMPRENANT UN COPOLYMÈRE À BLOCS

Publication

EP 3391143 A1 20181024 (EN)

Application

EP 16822939 A 20161216

Priority

- FR 1562781 A 20151218
- EP 2016081395 W 20161216

Abstract (en)

[origin: WO2017103082A1] Process for obtaining thick ordered films with increased periods comprising a block copolymer The present invention relates to a process for obtaining thick ordered films (typically > 20nm) with increased periods (typically > 10nm) on a nanometric scale of a composition comprising a block copolymer (BCP) deposited on a surface without degradation of the other critical structuring parameters (kinetics, structuring defects, critical dimension uniformity), this being whatever the orientation (perpendicular to the substrate, parallel to the substrate, etc.); this composition having a product χ effective*N (with χ effective = Flory-Huggins parameter between two blocks under consideration, and N the total degree of polymerization of these two blocks) of between 0.5 and 40.

IPC 8 full level

G03F 7/00 (2006.01); **C08L 53/00** (2006.01)

CPC (source: EP KR US)

C08F 297/02 (2013.01 - EP US); **C08F 297/026** (2013.01 - KR US); **C08J 5/18** (2013.01 - KR); **G03F 1/68** (2013.01 - US); **G03F 7/0002** (2013.01 - EP KR US); **G03F 7/2016** (2013.01 - KR)

Citation (search report)

See references of WO 2017103082A1

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

WO 2017103082 A1 20170622; CN 108369373 A 20180803; EP 3391143 A1 20181024; FR 3045644 A1 20170623; JP 2019507199 A 20190314; KR 20180095667 A 20180827; SG 11201804810Q A 20180730; TW 201734102 A 20171001; TW I658074 B 20190501; US 2018364562 A1 20181220

DOCDB simple family (application)

EP 2016081395 W 20161216; CN 201680073926 A 20161216; EP 16822939 A 20161216; FR 1562781 A 20151218; JP 2018530688 A 20161216; KR 20187020582 A 20161216; SG 11201804810Q A 20161216; TW 105141870 A 20161216; US 201616062513 A 20161216